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| EXAMINER |
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STELLING, LUCAS A

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| ART UNIT | PAPER NUMBER |
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1797

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| NOTIFICATION DATE | DELIVERY MODE |
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06/23/2009

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

ADIPFDD@bipc.com

| | | | |
|------------------------------|--------------------------------------|--|--|
| Office Action Summary | Application No. 10/560,240 | Applicant(s) KAISER, DIETMAR | |
| | Examiner Lucas Stelling | Art Unit 1797 | |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 08 April 2009.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 4-8-09 has been entered.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

3. Claims 1-20 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

4. No express support for the limitation "the separation device is non-rotatably fixed to the water tank" in claims 1 and 16 was found in the originally filed disclosure.

5. No express support for the limitation ""wherein the interior of the separation device between the inlet and the outlet of the separation device is imperviously separated ... by a solid wall of the separation device" in claim 15 has been found in the

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originally filed disclosure. There does not appear to be clear implied or inherent support for these limitations either. See MPEP 2163.06, *applicant should specifically point out support for claim amendments*; and MPEP 2163(II)(3)(b), *support may be express, implied or inherent*.

6. Claims 2-14, and 17-20 are rejected for their dependence on a rejected parent claim.

Claim Rejections - 35 USC § 102

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

8. Claims 1, 2, 4-6, 8, 9 and 15-20 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 5,430,910 to Wiley ("Wiley").

9. As to claim 1 Wiley teaches a water treatment arrangement comprising:

a separation device for an aqueous mixture which as been supplied with intake air (**See Fig. 4, space 160 forms a liquid air separation zone; and see col. 5 lines 60-65**); and

a water tank (**130, See Fig. 4 and col. 5 lines 40-45**) which is connected to it for cleaned water, characterized in that the separation device is non-rotatably fixed to the water tank so that the separation device and the water tank form a structural unit and the separation device for the aqueous mixture is surrounded at least in areas by the water tank for the cleaned water (**See Fig. 4**)

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10. As to claim 2, the devices are arranged concentrically **(See Figs. 2 and 4)**.
11. As to claim 4, the separation tube axially penetrates the water tank **(See Fig. 4)**.
12. As to claim 5, the inlet for the aqueous mixture is below the outlet for air **(See Fig. 4)**.
13. As to claim 6, **(See Fig. 4 a portion of the water in the water tank extends up into the separation tube)**.
14. As to claim 8, the water treatment arrangement is supplied with an outlet so a vacuum device can be supplied with water **(See at least 102 in Fig. 4)**.
15. As to claim 9, an integrated control mechanism is provided for the motor. The motor controls the pressure pump which produces the pressure to feed the wand and also controls the blower for removal of air from the separator device **(See 116 Fig. 1)**.
16. As to claim 15, Wiley teaches a water treatment arrangement, comprising:
 - a separation device having one inlet for an aqueous mixture which is to be separated **(See Fig. 4, space 160 forms a liquid air separation zone; and see col. 5 lines 60-65)**, and an outlet for connection to a vacuum pump**(See Fig. 4)**; and
 - a water tank **(130, See Fig. 4 and col. 5 lines 40-45)** which is connected to the separation device for cleaned water,
 - wherein the interior of the separation device between the inlet and the outlet of the separation device is imperviously separated from the interior of the water tank by a solid wall of the separation device **(See Fig. 4, between the inlet and the outlet tube 150 is a solid wall)**, and the separation device and the water tank for a structural unit

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which the separation device for the aqueous mixture is surrounded at least in areas by the water tank for the cleaned water (**See Fig. 4**).

17. As to claim 16, Wiley teaches a water treatment arrangement comprising a separation device for an aqueous mixture which has been supplied with intaken air (**See Fig. 4, space 160 forms a liquid air separation zone; and see col. 5 lines 60-65**); and

a water tank (**130, See Fig. 4 and col. 5 lines 40-45**) which is connected to the separation device for cleaned water,

wherein the separation device is non-rotatably fixed to the water tank so that the separation device and the water tank form a structural unit where the separation device for the aqueous mixture is surrounded at least in areas by the water tank for the cleaned water (**See Fig. 4**), and wherein one section of the water tank is a water separator for water which is entrained in air (**See Fig. 4 a portion of the water in the water tank extends up into the separation tube**).

18. As to claim 17, Wiley shows that the separation device is non-rotatably fixed to the water tank (**See Fig. 4**).

19. As to claim 18, Wiley shows liquid in the tank, so that some of the liquid surrounds the separation device (**See Fig. 4**).

20. As to claim 19, Wiley shows liquid in the tank, so that some of the liquid surrounds the separation device (**See Fig. 4**).

21. As to claim 20, Wiley shows liquid in the tank, so that some of the liquid surrounds the separation device (**See Fig. 4**).

Claim Rejections - 35 USC § 103

22. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

23. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

24. Claims 3, 10, and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Wiley.

25. As to claim 3, Wiley teaches the use of a filter for the drawn off air (**See 140 in I Fig. 4**). The filter will separate large particulate matter, which will then settle into the bottom of the water tank. Moreover, it is within the skill of a person of ordinary skill to provide a collecting sump reservoir at the bottom of the water tank in Wiley for the accumulation and disposal of the separated solids.

26. As to claim 10, Wiley teaches the device of claim 9, but the use of a four-way valve to control the flow of fluid in the device in Wiley is not taught, however the use of such valves are known in the art, and their use in Wiley would have been an obvious to

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control fluid flow within the system **(N.B. in Wiley there are four flow conduits 164, 142, 102, and 180).**

27. As to claim 14, Wiley teaches the device of claim 8, but is silent as to the type of pump used to draw fluid from the water tank. However, the use of liquid ring pumps are known to those skilled in the art as a low friction pump for drawing a vacuum and pumping fluid. Therefore, it would have been obvious to a person of ordinary skill in the art at the time of invention to use a liquid ring pump because of its low friction design.

28. Claim 7 is rejected under 35 USC 103(a) as being unpatentable over Wiley in view of U.S. Patent No. 3,684,093 to Kono et al. ("Kono").

29. As to claim 7, Wiley teaches the device of claim 6, but Wiley does not contemplate cyclonic separation inside the tube. Kono teaches that cyclonic separation can be produced by providing a tangential inlet **(Kono col. 2 lines 30-40)**. It allows for the radial separation of constituents in a fluid based on their relative densities **(Kono col. 1 lines 50-65)**. Therefore, it would have been obvious to a person of ordinary skill in the art at the time of invention to provide for a tangential inlet in the separator device in Wiley in order to allow for cyclonic separation of the particles from the fluid based on their relative densities.

30. Claims 11-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Wiley in view of U.S. Patent No. 4,475,264 to Schulz ("Schulz").

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31. As to claims 11, Wiley suggests that the separator is mounted onto a truck such as shown in Schulz.

32. As to claims 12 and 13, Wiley teaches the device of claim 11, and Schulz teaches a couple of tanks on the back of the truck as well as the pump (**Note also that Wiley runs associated pumps from the internal combustion engine**), Wiley also suggests discharging accumulated waste (**Wiley 104**), and a person of ordinary skill in the art would have known to provide a collection tank in cases where external discharge is prohibited or inconvenient (**See Wiley col. 1 lines 55-60**). As to the limitations of claim 13, it would be obvious to those skilled in the art at the time of invention to make any movements of the holding tank independent of the other units on the truck so that their position remains unchanged.

Response to Arguments

33. Applicant's arguments with respect to claim 4-8-09 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lucas Stelling whose telephone number is (571)270-3725. The examiner can normally be reached on Monday through Thursday 12:00PM to 5:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Duane Smith can be reached on 571-272-1166. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Las 6-16-09

/Matthew O Savage/
Primary Examiner, Art Unit 1797